

AMENDMENTS TO THE CLAIMS

1-6. (cancelled)

7. (Currently Amended) An LED device ~~characterized by~~ comprising:

an LED chip;

an LED reflecting plate made of a metal and having a recess where said LED chip is to be mounted; and

a printed wiring board on which said LED reflecting plate is to be mounted,

wherein said printed wiring board further comprising comprises:

a first through hole in which the recess of said LED reflecting plate is to be fitted, said first through hole being formed as a circular cylindrical hole which is substantially straight and vertical to said printed wiring board:

a plating film formed so as to cover continuously the entire surfaces of upper and bottom peripheral edges and a circumferential wall of said first through hole, wherein the plating film is separate from the LED reflecting plate; and

a terminal portion formed on a surface of said printed wiring board to be electrically connected to said LED chip, and

wherein said LED reflecting plate further comprising comprises:

a flat LED chip mounting portion which forms a bottom of the recess, and

a reflecting portion which forms a side wall of the recess and is inclined with respect to said LED chip mounting portion; and

a flange, formed on and along the entire circumference of an upper peripheral edge of the recess, to be bonded onto said plating film at a position thereof along and corresponding to the upper peripheral edge of said first through hole of said printed wiring board.

8. (Previously Presented) An LED device according to claim 7, characterized in that a space surrounded by said bottom and side wall of the recess of said LED reflecting plate is formed into one of a frustoconical shape and a frustopyramidal shape.

9. (Original) An LED device according to claim 7, characterized in that said LED reflecting plate comprises

a plurality of lands each comprising the recess, and

a first bridging portion which connects said plurality of lands in series.

10. (Withdrawn) An LED device according to claim 7, characterized by further comprising a thin metal wire which electrically connects said LED chip and said terminal portion,

said LED reflecting plate further comprising

a flat flange around the recess, and

said printed wiring board further comprising

a first substrate formed with the first through hole,

a second substrate which sandwiches, together with said first substrate, said flange of said LED reflecting plate the recess of which is fitted in the first through hole, and

a second through hole which is formed in said second substrate and through which said thin metal wire connected to said LED chip on said LED reflecting plate is extended.

11. (Withdrawn) An LED device according to claim 7, characterized in that a plurality of LED chips are mounted on each recess of said LED reflecting plate.

12. (Withdrawn) An LED device according to claim 10, characterized in that said printed wiring board further comprises

an electrical connection hole formed in a portion of said second substrate which is above said flange, and

a wiring line which is formed on a surface of said second substrate and electrically connects the electrical connection hole to said terminal portion.

13. (Original) An LED device according to claim 7, ~~characterized by~~ further comprising a cooling member which ~~comes into~~ is in contact with a bottom of the recess of said LED reflecting plate and with said plating film at a position thereof corresponding to the bottom of said first through hole.